

Background brief

Why Roadmapping?

Cement sector is literally the building block of modern infrastructure and will remain so for the foreseeable future. Although material substitution will play a large role in cutting emissions from this sectors, massive amounts of cement will be needed to produce the buildings, infrastructure and equipment needed. However, the cement sector has a large carbon footprint. There are technological solutions within reach that would allow for close to zero-emissions production of cement.

Decarbonization of cement sector constitutes more than a technological transition. The sector is deeply embedded in our economies and societies. As such, cement sector decarbonization represents a major socio-technical transition, involving co-evolutionary shifts in markets, business models, policies, infrastructure, consumer behaviour, norms and institutions. The transition to a more decarbonized cement sector is also deeply political and context specific. Under these circumstances of uncertainty and contestation, navigating a path toward cement sector decarbonization can be a significant challenge. One approach to build momentum and overcome inertia around transition is using roadmaps, which provide a predetermined goal or target associated with a desirable future and set out possible pathways, strategic plans, actions, and policies required to reach that point.

Industry transition roadmaps can serve as analytical tools for understanding, framing, and shaping complex transition processes. They offer an opportunity to set out the timing and sequencing of policy, investment, and innovation in such a way that reduces the risk of industries being locked into higher emission trajectories due to the long lifespans of industrial assets. Perhaps most importantly, roadmap processes can open space for actors with different interests to negotiate and construct multi-faceted decarbonization pathways.

Why should you join this workshop?

In this workshop, you will be using the [Roadmap Planner](#) which provides decision-makers with detailed guidelines and recommendations to identify the main steps, key actors, and essential actions and measures to meet decarbonization targets and achieve industry transition vision. You will join 40 participants across the cement sector, relevant value chains, public policy, civil society and academia.

What to expect on the day?

Discussing cement industry's present situation

We will have a dialogue among all the stakeholders to understand the present situation in cement industry in India followed by a discussion on additional aspects relevant to understanding these industry's size, impact, progress, and challenges to decarbonization.

Setting a time-bound target for transition

In breakout rooms, by using the "roadmap planner" stakeholders will envisage a time-bound target. Given the present situation in cement sector and existing plans and/or ambitions for

decarbonization, an end-point target for transition will be set. The end-point target of the roadmaps must be tailor-made and feasible for target industries and entail a specific and clear time horizon.

Considering the existing carbon emission mitigation targets and commitments at relevant scales (international, national, and industry specific), LeadIT and TERI will make an initial proposal for a target coherence with those targets and visions. An open discussion will follow for stakeholders to reflect and comment on the initial proposal, and after discussion and adjustments, the final target will be set and approved by all actors involved in the process.

Mapping out areas of opportunities and challenges

After understanding the current conditions and setting a specific target, actors will discuss opportunities, challenges, needs, and requirements to achieve the set target for transition. It is of high important for the key actors involved to have the existing measures and ongoing processes in mind as the baseline, and always look toward the set target to identify opportunities and challenges particularly relevant to the path toward achieving that target.

For this mapping exercise, we will have a structured brainstorming session, identifying opportunities, challenges and needs for industry transition within three key areas, including policy, finance, and technology, which have been recognized and studied as the main enablers in the existing industry transition roadmaps. This structure and clustering also relate to different groups of stakeholders involved in the roadmapping processes and provide a space for all key actors to identify opportunities and levers, and challenges and barriers to transitioning cement industry in India.

How to prepare?

Participants are invited to attend the workshops prepared. The following materials and the attached infographic can be used as a guide.

1. Please familiarise yourself with the “[Roadmap Planner](#)”
2. GCCA 2050 Cement and Concrete [Industry Roadmap](#) for Net Zero Concrete
3. For other sectoral and national roadmaps, visit [Industry Transition Tracker](#)

Next steps

Following the workshop, LeadIT Secretariat and TERI will collectively draft a synthesis report to consolidate knowledge co-produced by key actors in the first workshop, and make the process and results transparent, accessible, and operational. The synthesis activity will report on the level of ambitions, opportunities and challenges to decarbonizing cement industry in India.

The Roadmapping exercise will continue with the second workshop in March 2022 which will be focused on identifying actions and measures, and areas of responsibilities for key actors to accelerate transition in the cement sector. The objective of this workshop is to make progress toward developing industry transition roadmaps for cement sector in India.